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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/879,168	06/13/2001	Pere Obrador	10006278-1	3661

7590 05/23/2003

HEWLETT-PACKARD COMPANY  
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EXAMINER

LEE, Y YOUNG

ART UNIT


PAPER NUMBER

2613

DATE MAILED: 05/23/2003

b

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No. <b>09/879,168</b>	Applicant(s) <b>Pere Obrador</b>	
	Examiner <b>Y. Lee</b>	Art Unit <b>2613</b>	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (e). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on May 16, 2003.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Queyle*, 1935 C.D. 11; 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above, claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claims \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.  
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some\* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\*See the attached detailed Office action for a list of the certified copies not received.

- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).  
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                              | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____  |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)          | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____ | 6) <input type="checkbox"/> Other: _____                                    |

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## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-20 are rejected under 35 U.S.C. 102(b) as being anticipated by Talluri et al (6,026,183) for the same reasons as set forth in Section 8 of the last office action, paper number 4, dated 2/11/03.

Talluri et al, in Figures 3, 5, 10, and 11, discloses a content-based video compression that is the same apparatus and method for applying multi-resolution boundary encoding to region based still image and video encoding as specified in claims 1-20 of the present invention, comprising dividing an original image into a plurality of regions, wherein a plurality of boundaries associated with the plurality of the regions is detected (Fig. 5); encoding each of the plurality of the boundaries by two periodic wavelet series (e.g. H and L) such that each encoded boundary contains a plurality of coefficients (col. 11, lines 1-3), where the coefficients correspond to a plurality of boundary resolutions (e.g. HH1 and HH2 in Fig. 11); decomposing each of the plurality of the regions in the original image into four subbands (e.g. LL, LH, HL, and

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HH) each having a first boundary resolution using low/high pass horizontal and low/high pass vertical frequency filters (col. 11, lines 1-34); successively decomposing each of the plurality of the regions in a subband into one or more subbands (i.e. LL2, LH2, HL2, and HH2), each having a second boundary resolution, wherein the second boundary resolution is lower than the first boundary resolution (Fig. 11); transmitting boundary and image information (Fig. 1, Transmission Channel) having a selected resolution (e.g. HH2); successively transmitting boundary and image information having higher resolution (e.g. HH1) than the selected resolution HH2; reconstructing image information at a selected resolution HH2 in a receiver (Decoder) by combining the image information in one or more subbands having a lower resolution (e.g. HH3) than the selected resolution HH2; and successively reconstructing image information at a yet higher resolution (e.g. HH1) than the resolution HH2 in the receiver by combining the image information in one or more subbands having a lower resolution (i.e. HH2 and HH3) than the yet higher resolution HH1, until the original image is reconstructed (Fig. 15b).

### *Response to Arguments*

3. Applicant's arguments filed 5/16/03 have been fully considered but they are not persuasive.

Applicant asserts on pages 6 and 7 of the Remarks that the various decomposed subbands of Talluri et al contain the same resolution information. However, Figures 10c and 11 of Talluri et al illustrate that the various successive decomposed image regions into subbands have different

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boundary resolutions (e.g. HH1-HH3), wherein the second boundary resolution HH2 is lower than the first boundary resolution HH1 as recited in applicant's claims 1-20.

*Conclusion*

4. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

5. **Any response to this final action should be mailed to:**

**Box AF**

Commissioner of Patents and Trademarks

Washington, D.C. 20231

**or faxed to:**

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(703) 872-9314, (for formal communications; please mark "EXPEDITED  
PROCEDURE")

(for informal or draft communications, please label  
"PROPOSED" or "DRAFT")

**Or:**

Hand-delivered responses should be brought to Crystal Park II, 2121 Crystal Drive,  
Arlington, VA., Sixth Floor (Receptionist).

6. Any inquiry concerning this communication or earlier communications from the examiner  
should be directed to Y. Lee whose telephone number is (703) 308-7584.

  
**Y. LEE**  
**PRIMARY EXAMINER**

Y. Lee/yl  
May 21, 2003